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THE FEDERAL VALUATION OF RAILROADS IN RELATION TO A DEFINITE POLICY OF NATIONAL RAILWAY CONTROL

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There has been recently a widespread demand for discontinuing the federal valuation of railroads made by the Interstate Commerce Commission in accordance with the Railway Valuation Act passed by Congress and approved March 1, 1913. The discontinuance has been urged on the patriotic grounds that the engineers, accountants, and clerical forces are needed in the war or in work connected with the war, and that the valuation now has only secondary importance.¹

¹ The day before this paper was presented, President Wilson issued a proclamation seizing all the railroads and their appurtenances in behalf of the federal government. The plan of operation provides for a Director-General who will work through a committee of practical railroad men and who will continue the existing organization of the individual companies.

In general, the plan is one of national *super-control* and not of outright government ownership and operation. It is substantially the kind of organization that I had in mind in the preparation of this paper. It provides for a national railway system, without initial disorganization of management, and without the danger of political manipulation. While certain details were determined by immediate war conditions and will probably have to be changed later, in general, the plan seems to me to furnish the most desirable permanent policy, although, of course, what should finally be done will depend upon the success of the operation during the war. However, it now seems inconceivable that after the railroads have been merged into a single system they should be returned to *status quo ante*, broken up into the original competitive units.

From the standpoint of permanent policy, there are two important points in which the President's plan should be materially changed: (1) as to the body exercising super-control, and (2), as to the method of compensating the railway investors. For the purposes of the war, the creation of a director general, not connected with any existing government organization, is probably desirable. Permanently, however, the super-control probably had better be lodged with the Interstate Commerce Commission, which should be the national board of railway directors, performing for the country at large the same function that is exercised by the board of directors of an individual company. The Commission is an existing organization and is excellently fitted to determine the general policies. While a director general should probably be employed, he should be responsible to the Commission in carrying out operating policies.

As to compensation, the President's plan guarantees to each company the average net operating income for the three years preceding June 30, 1917. As a practical war measure, this is probably the most satisfactory immediate arrangement. It is reasonably liberal to the railroads and at once frees the investors from all financial uncertainties, so that the traffic may be freely shifted according to national requirements, and new investments may be made at the government's direction, all without affecting any private interests.

For permanent purposes, however, the basis of compensation probably will

To what extent the demand is in good faith is difficult to say. If the valuation were not in process, it should probably not be started at the present time. But it is well under way; several minor valuations are practically completed, and most of the important ones are well advanced. If it is worth doing, it should be actively continued; otherwise much of what has been accomplished would be lost, energy would be wasted in beginning again later, and the undertaking might be permanently abandoned. If there is a shortage of engineers, accountants, and other technical men, should not adjustment be made in other enterprises of less national significance?

But we face the question whether the valuation is really of great national significance. The railroads have always maintained that it will not be worth the tremendous expense involved. The costs have already run into many millions of dollars, and no one knows what the total outlay will be, but probably not less than \$75,000,000. To justify this huge expenditure we should be quite certain why it is made. I must confess that as the law stands now, and so far as any clear policy has been based upon the valuation, I do not see the justification of the tremendous outlay. I thoroughly believe that the valuation should be continued, as prob-

have to be changed. The average operating income of the past three years is bound to be unsatisfactory. It is too rough a method. In many cases it would make permanent an unreasonably high return, while in others it would perpetuate an unduly low return. The desirable basis of compensation cannot be the more or less accidental income of three particular years, but must be based on investment or some figure connected with investment. For permanent purposes, therefore, a definite valuation should be placed on the property of each company and a fair return allowed on the amount. While in this paper I rather favored placing upon the investors the risk of earning the return, in view of the new development, probably the better and perhaps the only practicable policy is to guarantee the return, freeing the investors from all the risks of the business. That would justify a lower rate of return than would otherwise be necessary, and for future financing would leave the government free to act according to national needs.

If, then, the new government railway policy is made permanent, the valuation of the railroads that is being made by the Interstate Commerce Commission may be used as the basis of compensation, and so fix the amount of the investment entitled to a return. The change from a temporary to a permanent basis should be clearly provided for by Congress. It may be made in one of two ways: (1) As the valuation of any property is completed, the amount may be taken as the basis of future compensation. (2) The present guarantee may be fixed for a definite period (say, five years) to give time for all valuations to be completed. The second plan would probably be more certain and leave less chance for speculation.

If the new general policy is not made permanent, we shall again face the question of what to do with the railroads. For the purpose of working out some definite policy, the Interstate Commerce Commission's valuation will still be essential. It should under no circumstances be discontinued. The results will inevitably be needed for any reasonable national policy of railway control.

ably do the great majority of economists and people interested in regulation from a broad national standpoint. But I feel, nevertheless, that the belief rests largely on hopes, and not on purposes already expressed in definite national policy.

What is the purpose of the valuation? The Valuation Act requires the Interstate Commerce Commission to make an inventory of all the property of interstate railroads, to find the original cost of the property, the cost of reproduction, the depreciation and other elements of value, to analyze the capitalization and to report the financial history of each company. How the results are to be used does not appear. There is not even the provision that the final value of each property shall be definitely determined. Doubtless the figures are intended chiefly for tax purposes and for rate hearings to determine the valuation on which the companies are entitled to earn a return. They will serve both the Interstate Commerce Commission and the various state commissions, but their use is nevertheless uncertain and at best cannot be conveniently made. No definite procedure has been established. Unless a clear policy is determined, it seems exceedingly doubtful whether the costs of the valuation will be justified.

I believe that a policy can and should be worked out which will incorporate the valuation figures for permanent purposes, and will greatly simplify the regulation of railroads. Everyone knows that the present methods of railway regulation are unsatisfactory; they are indefinite, unwieldy, and do not achieve their main purposes. They must be simplified and worked into a definite policy which can be kept under accounting control. The purpose of this discussion is to consider the present valuation of railroads in connection with a definite policy of national railway control; to outline a policy which will control in a practical way, will make definite the principles and purposes of regulation, and will permit the desirable national railway developments.

Let me outline in general the plan that is proposed: (1) In connection with the present valuation of railroads, Congress should authorize the Interstate Commerce Commission to determine officially the amount on which each company shall have the right to earn a return, and for this purpose should fix a definite method of valuation or should authorize the Interstate Commerce Commission to do so. (2) Congress should provide that when the valuation of any property is completed the results shall be taken into the accounts of the company, and thereafter the accounts

shall be kept so as to show constantly both the valuation entitled to a return and the return actually realized, so that the return may be readily compared with the valuation, and its adequacy automatically determined. (3) Congress should finally determine the principle by which the returns can be readily adjusted, increased, or diminished according to the requirements of any company.

I

The first great difficulty of present railway regulation appears in determining the valuation on which a company has the right to earn a return. All that is positively stated by the Interstate Commerce Act is that rates shall be reasonable, and that the Interstate Commerce Commission shall establish reasonable rates. But how the reasonableness shall be judged, or what constitutes an unreasonable rate, is not defined. The Commission has a duty to perform with no clear instructions as to how to proceed, and no power to determine a comprehensive plan of desirable procedure.

In the absence of legislative definition, the more specific determination of reasonableness has necessarily fallen upon the courts. Except for the general order that rates shall be reasonable, practically the entire procedure of rate regulation has been determined by the courts, when properly it should have been fixed by Congress or by the Interstate Commerce Commission in place of Congress. Any detailed method of regulation constitutes a public policy, and to determine public policy under our government is a legislative function. To establish rate regulation in the first instance was undoubtedly an act that could not have been performed by the courts; but to provide a procedure by which reasonable rates may be determined was also a matter of public policy, likewise properly determined by legislative enactment. Congress, however, did not provide a detailed plan, but simply directed that reasonable rates should be established. Consequently when the Interstate Commerce Commission has fixed rates, the final test of reasonableness has fallen to the courts, which then have been practically compelled to formulate a policy in particular cases.

My purpose is not to berate the courts. They were compelled to act where Congress had failed to make thoroughgoing provisions for regulation, and they were not free to fix a reasonable plan based upon general desirability, but were restricted to the requirements of justice to the investors. It is one thing to declare

that rates shall be reasonable, and quite another definitely to prescribe how they shall be determined. The two obviously go together in complete legislation, but Congress, as in many cases of economic legislation, acted only partially and therefore placed the burden upon the courts to fix a definite procedure.

The test of reasonableness that has been adopted is that in general rates must be high enough to bring a fair return on the value of the property devoted to the public service. Rates that bring more than a fair return are excessive, and those that bring less are too low. Cost is the more specific standard, such cost including operating expenses and a fair return on the property. Cost rate-making involves very great difficulties, but these will be considered later. Let us now restrict ourselves to the valuation of the property entitled to a fair return.

In general, the proposition that a company is entitled to a fair return on the value of its property sounds definite and practical; nevertheless this has caused and is causing one of the chief confusions in regulation. The difficulty is, *what is the value of the property?* We cannot consider this question extensively, but obviously, whatever the courts may mean, it cannot be the value of the property in the sense that would be employed in an ordinary commercial enterprise. It is an economic commonplace that the value of a business depends on the earning power, and in a railroad the earning power depends on the rates. Consequently, if value were really to be the basis of rates, rates could never be reduced.

The circle of value and rates has been pointed out perhaps a thousand times, but the court decisions have been fixed, and they rest at value. As a matter of fact, however, in any practical rate proceeding, value has been disregarded. We make valuations for rate purposes, and when reductions in rates are made the *valuation* is less than *value*. But no definite method of valuation has been adopted. While certain partial processes have been favored, no clear method has ever been established. Moreover, valuation has never been considered from the standpoint of public policy, from the broad view of what would be nationally desirable; the courts have necessarily been concerned with the rights of investors and, therefore, have always come back simply to *value* as the basis of rates. The result is that in every considerable rate case, both as to railroads and other public utilities, the records are clogged up with discussions of value, what it means, what should be included,

etc. There is indefiniteness and delay, and real regulation breaks down with its own uncertainty and cumbersomeness. Every one closely connected with regulation knows that by present methods it is impossible to regulate in reality. Because of the indefiniteness and unwieldiness, we cannot keep control of the companies so that they may get a fair return on their investment and not much in excess.

For illustration, let us consider the so-called 15 per cent freight case. The railroads in eastern official territory are before the Interstate Commerce Commission in what they deem an emergency situation, asking for a general increase of 15 per cent in freight rates. The Commission first refused the increase, but allowed moderate advances on certain commodities. Now the case has been reopened for further consideration. But what clear basis has the Commission either for granting or denying the increase? Is it in a position to know at all definitely whether a particular road deserves the desired advances or not? There is no way by which it can determine even approximately whether any particular company has been getting a fair return; and there are other difficulties which will be considered later. The decision must rest mainly upon more or less skillful guesswork and upon the practical consideration, whether on the whole the increases would be approved or condemned by the public. This is obviously an unsatisfactory situation; the basis for refusing or granting the increases should be definite and clear.

I am not bringing charges against the Commission. Under present law it simply cannot but make unsatisfactory decisions. It must do the best it can under the law, and it has done exceedingly well. But we should recognize the difficulties, decide what sort of regulation we wish, and fix clear and practical methods for the purpose. But this is a legislative matter, based on comprehensive investigation and study of desirable railway policy. It should be carefully considered by a special congressional committee and reported to Congress for action. It might well be included in the investigation by the Newlands Committee of the United States Senate and made the basis of a comprehensive revision of the objects and methods of railway regulation.

It seems to me, then, that the first step out of the present rather chaotic situation is for Congress to determine a definite method of valuation (1) in regard to past investments and (2) in regard to future investments. As to the past, the decision would

have to rest on broad grounds of national expediency or reasonableness, and would probably have to be somewhat arbitrary. It could not meet all the fine points of justice, but it should nevertheless be equitable in general, should consider the public welfare, and should be workable. When adopted, it should be applied to all properties to determine the investment entitled to a return. No modification for individual cases should be permitted, or the work of valuation would be greatly impeded; there would be interminable discussions of detail, and the purpose of the rule would be largely defeated. When the value of any property is once definitely established, the company should then have the definite right to earn a return on the amount.

For this purpose, the present valuation of railroads has obviously paramount importance. With the method of valuation clearly determined, the results would be definitely taken as the company's past investment entitled to a return, and all uncertainties of the past would be resolved once for all. But to accomplish this, congressional action is necessary; it should not be left to the courts.

I do not propose to argue for any special method of valuation. There are several possible methods, each having its own special advantages and disadvantages. But which particular method is adopted is of great importance both to the companies and to the public. The selection will require exceedingly careful consideration. The choice would probably lie between the so-called reproduction cost of the property less depreciation and the actual original (installation) cost less depreciation. Whether the reproduction cost or installation cost is used, would make a difference in the valuation of railway lands amounting perhaps to two billion dollars. This choice should then be made once for all on grounds of national expediency, and not left to chance requirements of particular cases. Congress should adopt a definite method of valuation and should act from the standpoint of desirable national policy.

The selection of a method must finally depend on our sense of reasonableness and our view of the general welfare. The method should probably be judged principally by the following five standards: (1) It should be definite and clear, so that it can be easily understood. (2) It should be simple, so that it can be readily applied. (3) It should not break violently with present legal standards, although these are unsettled and the rule itself is to

be adopted to clear up present uncertainty. (4) It should have regard for what the investors reasonably expected when they put their capital into the business. (5) It should not sacrifice the general welfare through narrow regard for individual justice or claims.

As for the future, the best basis of valuation is simple. The reasonable and practical method would be to allow a return on actual additional investment; there could scarcely be an alternative rule. But it should be made clearly a policy by legislative authority, so that the relation between railway investors and the public would be exactly determined.

II

The second fundamental point in the plan proposed is that Congress should provide complete accounting control. Both the investment entitled to return and the return actually realized should be shown by the accounts of the company. The procedure might be outlined directly by Congress or more desirably by the Interstate Commerce Commission under the authorization of Congress. The rights of investors and the obligations of the public should be definitely shown by the accounts controlled by the Commission.

Since 1909² the Commission has prescribed a uniform system of accounts for all interstate railroad companies. These accounts provide in considerable detail for showing the investment in different classes of property, the liabilities and securities outstanding, the various reserves and surplus, also the revenues and expenses connected with the operation. As a system, especially as revised since the first issue, the accounts as prescribed are satisfactory. Various minor criticisms might be made, but on the whole the system provides a fairly adequate mechanism for the automatic accounting control that is urged. The difficulty is, the investment figures shown in the accounts cannot be taken as the basis of regulation. This, however, is not true of the accounts dealing with operation; the operating revenues are absolute matters, and the operating expenses and other charges that should be borne by the public are fairly definitely determined. Neither can any important criticism be made of the Commission's operating policies in relation to depreciation and renewals of property.

² This property and expense classification became effective January 1, 1909, but the revenue classification, July 1, 1907.

The return on investment shown by the present accounting control is, therefore, fairly trustworthy, though it is not coupled up with a complete policy of regulation.

The real difficulty appears with the property or investment accounts. The property figures have no significance for regulatory purposes. They represent mostly the equalization of security issues, and the methods of past security issues are too well known to require consideration. It would be exceptional if in any case the investment in road and equipment shown would be even approximately equal to the fair earning value of the property determined by reasonable methods. They are book figures and nothing more, and their annual publication by the Commission has meant not only largely wasted effort, but has tended to create misleading impressions as to railroad investments.

The criticism should be modified as to property installed since the Commission's accounting rules were put in force. The investments since 1907 have probably been fairly satisfactorily reported. But of most of the important railroads, the property accounts extend back fifty to seventy-five years or more, and the charges may include both original capitalization issued without actual investment and later overcapitalization due to consolidations of properties; and, in some instances, overcapitalization through inadequate maintenance, with renewals financed through the issue of capital securities.

The property accounts, therefore, serve no purpose in our scheme of regulation. If we are to have an official valuation of all railroad properties, the accounts of the companies should be rewritten accordingly, so that for each company a particular account would show the earning value of that particular class of property in service, and so that all the property accounts together would show the total investment entitled to a return. Thereafter, the cost of all additions and improvements would be added to the accounts and when old property is retired from service its original valuation or cost would be written off the accounts at the same amount as it stood charged. The balance of the property accounts would always show the investment entitled to a return. In any case, then, references to the books would show immediately both the valuation entitled to a return and the return actually realized on the property. There would be automatic accounting control; the facts would not only be instantly ascertainable, but they would be regularly checked to show the results of operation.

To present the facts as desired, a comprehensive policy would have to be authoritatively adopted, which would provide for the maintenance of property, including depreciation, retirements and replacements; and the property accounts would have to be treated accordingly. There might be alternative procedures, but whatever operating plan and special accounting devices are adopted, the fundamental facts should always appear—the investment entitled to a return and the return actually realized. It should always be clear whether the revenues are greater or less than required for the return on investment. The Commission's present provisions for maintenance and its accounting requirements for operation are satisfactory, except that they are not coupled up with a comprehensive and practical system of regulation.

It should be mentioned that the Valuation Act requires that as additions and other changes in the property are made they shall be reported and the Commission shall keep the valuation up to date. This is an excellent provision, and the Commission has already taken steps for the purpose. But as the law stands, the valuation records will have to be kept in supplementary files and will not be shown in the property accounts of the companies; and while the figures may be used as *prima facie* evidence in any case, they will have no definite significance for any regulatory purpose. They will merely furnish evidence of value, but will not constitute the value clearly recognized as entitled to a return. As prices shift and business conditions change the valuation will tend to become obsolete. Why not incorporate the figures definitely in the accounts and keep them up to date to show the investment entitled to a return? Would that not be the simplest and clearest procedure?

The question may be raised, whether if the official valuation on the books be taken there should not be also an adjustment of the liabilities and securities covering the property. If in any case the official valuation should be considerably less than the past book figures, then the revision of the property accounts would necessarily result in showing a deficit in the company's books. How should this book deficit be treated? In some instances, the earning value of the property may be completely covered by the bonds and current liabilities; then what adjustment should be made for the capital stock outstanding?

The broader question of policy is, whether, if the property ac-

counts are rewritten so as to show definitely the earning value, the capitalization should not be adjusted to the same basis. In some instances there might be difficulties, but would they be insuperable? The capital stock could always be scaled down, and except in unusual cases the bonds outstanding would not be disturbed. If the adjustments in capitalization were once made, then the investment entitled to a return would be shown by the amount of securities outstanding, which would be the clearest way of showing the earning value. Subsequently, if the property is satisfactorily maintained, the additions to the investment would be shown by the new securities issued. The Commission could then control the investment merely by requiring proper maintenance of property and controlling the issue of securities. This would be simple, but it would involve the control of capitalization for which the Commission should receive legislative authority.

But even if the securities outstanding are not adjusted to the earning value, the property accounts should nevertheless be rewritten according to the results of the official valuation. The overcapitalization would in most cases pertain only to stock, seldom to bonds, and the amount could be shown as a permanent discount. In many cases the valuation may exceed the securities and obligations outstanding; then the difference might be shown as a permanent capital reserve. But, however the matter be treated, it should be determined definitely and consistently with the general policy of regulation established.

III

The third fundamental step in a thoroughgoing policy of regulation, after an official method of valuation has been established and complete provisions are made for keeping track of the valuation showing the returns actually realized, is to provide for the proper adjustments of the returns, so as to cut off excesses and to make up deficiencies. Two alternative methods may be considered: (1) to reduce or increase transportation rates as returns are excessive or too low; and (2) to permit the fixing of rates according to commercial considerations, limit dividends to a fair return on the investment, and take the excess profits for public purposes in the form of special franchise taxes.

While no definite policy has been established, the Interstate Commerce Commission has been following as best it could the first method, attempting to control the return on investment through

the fixing of transportation rates. As already stated, the law has required that rates shall be reasonable, and the return on the investment has become the fundamental basis by which reasonableness is judged. Except for arbitrary discriminations, rates have seldom been considered unreasonable *per se*; they have been rendered unreasonable through excessive earnings. The ideal has been to fix rates at cost, including in cost operating expenses and a fair return on investment.

I shall not attempt to discuss at length the theories of rate making, for I should be considering largely economic commonplaces. I assume, however, that economists are pretty well agreed that the *cost of service* is not a practical method of railway rate making, and to the extent that regulation has been following that method it has been wrongly directed. I may be mistaken in my assumption of general agreement; but at least the question should be carefully considered by an authoritative body whether cost rates are feasible and whether they furnish the best method of controlling the return on investment.

I believe that the only practicable general basis of railway rates is value of service, or as frequently stated, charging what the traffic will bear. But I believe also that investors should not get the benefit of excessive returns realized through such rates. If rates are fixed according to what business conditions permit, dividends should be limited to a fair return on investment, and the excessive earnings should be taken for public purposes in the form of special franchise taxes. The unreasonable thing is not that railroads fix rates according to the value of their service to the public, but that they receive excessive profits from a business which has a recognized public character. What in itself is there unreasonable in charging what the traffic will bear? It means such rates as will develop traffic to the point of greatest profitability. Such rates cannot be arbitrary; they must have proper regard for the commercial development of the communities served by the railroads; they cannot be so high as to take an undue share of the gross profits of production.

If rates are fixed according to commercial considerations, again what grounds are there for objecting to the rates themselves, provided that there are no arbitrary discriminations between shippers? Is not the value of the service the basis of prices or rates in all non-regulated production? Is there even clear reason for believing that if railway rates are less than what the traffic

will bear, at least as to freight, the final consumers of commodities receive the benefit? For the most part do not the lower rates merely mean a readjustment of business profits, with prices of goods to ultimate consumers practically unchanged? It must be remembered that freight rates constitute business costs and do not fall directly on consumers. For the most part, would not charging less than business conditions justify simply keep excessive profits from the railroads and give them to the manufacturers and dealers? But why give the latter more than their services are worth? Why not let them pay for the full value of the transportation, and then take the excessive railway earnings for public uses? If we keep unreasonable profits from the railway investors, do we not prevent the fundamental thing which has been deemed to make rates unreasonable?

I hold to the value-of-service theory, however, not because I believe that it represents a social ideal in itself, but because the cost theory is unworkable. While most economists comprehend the difficulties well enough, many have nevertheless declared themselves in favor of cost rates. They have done so in part perhaps because they have not visualized sufficiently the difficulties or impossibilities involved, but chiefly because they feel strongly the undesirability of leaving to the investors excessive earnings from a public enterprise. I thoroughly agree with this view, but why not employ a workable basis of rates and then proceed directly to prevent undue profits?

I shall not attempt to discuss at length the objections to cost rate making. The chief difficulties are: (1) There is no definite or even approximately definite transportation unit on the basis of which cost may be determined. (2) The costs are largely joint, so that they cannot be directly charged to specific services. (3) To a considerable extent the costs are constant,—they do not vary with the quantity of service. And (4) closely connected with the foregoing is the financial difficulty that at uniform cost rates, whatever transportation unit be used, in most cases the roads would not be sufficiently utilized to bring the necessary return on investment, so that differential rate bases are inevitable if the investment is to be self-supporting. These, of course, are economic commonplaces. There is one point, however, which has not received extensive consideration, and which finally renders cost rates impracticable. It is well known that railroads are so interdependent that changes of important rates on one line will necessi-

tate corresponding changes on other lines. Railway rates form a vast and intricate structure upon which depends the economic equilibrium of large industrial areas. No railroad can be treated independently, with its rates determined according to its own cost factors. Other roads must be considered, whether they have higher or lower costs, and even if they do not come into immediate or direct competition. How, then, can cost rates be maintained?

To illustrate the point, suppose we take two roads with the same termini, or which reach the same markets, the one running through rich territory, and the other through a poor region. The first naturally has low costs because of heavy traffic, and the second has high costs because of light traffic. Both have the same general level of rates, so that the first is making excessive earnings, while the second is not receiving a fair return on investment. How would you reduce rates on the one and raise them on the other? If you were to attempt it, would you not upset all the industrial relations of wide areas, established by far-reaching competitive forces? Suppose you lower the rates on the prosperous road and reduce its earnings to a reasonable amount, would you not inevitably destroy the business of the poorer road? The latter could not charge relatively higher rates than its better located competitor, whatever the permission of the regulating authority. If you let the poor road earn a fair return, you would have to allow the other excessive returns; but if you restrict the latter to a fair return, you would confiscate the poorer investment. What would you do?

This is the chief difficulty that the Interstate Commerce Commission has faced the past four years in every important petition for increased rates, and is bound to face until the fundamental facts of the railroad business are recognized in our method of regulation. Operating costs have been increasing rapidly. The poorer roads have been working under tremendous disadvantages, and have doubtless deserved higher rates. But the stronger roads have not needed relief; their excess earnings in most cases have simply been diminished. But the Commission has not been able to grant the poorer companies the increases that they deserve without adding to the unearned profits of the others. What could the Commission do but to compromise, granting some advances but disallowing the general increases? But obviously such compromise does not help the poorer roads as much as they deserve, and adds to the excessive returns of the others. And, as in the

present emergency, it prevents the desirable development of railway facilities.

Why should not freight rates have advanced in recent years somewhat in accordance with the increase in other prices? With the immense profits made in most lines of industry, what special imposition upon business would there have been if some of the excessive profits had been absorbed by the railroads, provided that undue returns had not been allowed to railroad investors? If freight rates had been freely fixed according to business conditions, the poorer roads would be in fair financial condition, while the others would have contributed their excess earnings to the public revenues. Would not this have been a thoroughly reasonable situation? The inelasticity of freight rates doubtless has greatly restricted railroad developments, has prevented many investors from getting what they should receive, and at best, by keeping railroad profits down, has merely added to the excessive profits of other industries.

If the proposed policy had been in force, there probably would have been sharp rate increases in recent years, but would not the consequences have been desirable? There is the further point that sharp increases would have prevented much of the congestion of traffic when the railroad facilities have been needed for war purposes. With considerably higher rates, transportation would have been greatly diminished, and the railroads would have been reserved for goods whose transportation has been the more urgent. But with the rapidly increasing prices in nearly all industries and with fixed and low transportation charges, the tremendous pressure upon the railroads became inevitable. Vast quantities of goods have been transported that should not have been carried according to any reasonable national policy, and now shipments have to be regulated by priority determination instead of automatically by the commercial adjustment of rates.

Why not fix rates freely as commercial conditions justify or demand, and take excess profits for public purposes? I do not mean that the Interstate Commerce Commission should give up its power over rates; it should prevent arbitrary discrimination and should coöperate with the railroads to establish throughout the country a network of relatively reasonable rates. But if we wish to restrict the return on investment, is not the way proposed much more satisfactory than the roundabout method of cost rate making?

IV

In conclusion, it seems worth while briefly to consider the more important criticisms and to review the chief advantages of the entire scheme of regulation that has been proposed.

Constitutionality.—The first criticism to be considered is that the plan would violate the Constitution of the United States. The question is whether it would be possible under our Constitution to take profits from a company that were realized through rates legally authorized. If a company has been charging rates permitted by law, can the resulting profits in excess of a fair return on investment be taken for public purposes? Would that be taking property without due process of law?

No absolute answer can be made. But if the scheme were moulded into a clear public policy, and if the entire procedure seemed reasonable, I cannot see on what grounds the law could be declared unconstitutional. At present the Interstate Commerce Commission is expected to fix rates at such a point as not to bring more than a fair return on investment, and there is no question about the constitutionality of the provision. If, then, the return on investment can be restricted indirectly through rates, why not directly through limitation of profits? The only probable constitutional danger would appear in determining the basis of valuation for past investment. The method finally adopted would have to be very carefully considered, and the reasons for it would have to be very clearly stated. To avoid the danger, even if a rule very liberal to investors were adopted, the definiteness for the future would probably justify the liberality and the additional burden placed upon the public. The proposal really amounts to a rigorous excess-profits tax in an industry with a recognized public interest, with the procedure clearly defined by legislation. Is the scheme not reasonable? Is it not desirable? If so, is it not constitutional?

Guarantee of return on investment.—The second criticism likely to be made is that if the return on investment is limited there should be a guarantee of the return, so that railway investors may be free from any business risks connected with the industry. But why does it necessarily follow that if a return is limited it must be guaranteed? While I am inclined to believe that the risk of earning the return had better be left upon the investors, that is a matter of specific policy, and not of logical necessity. My preference is that, except as to arbitrary discrimination, the rail-

roads should be free to fix rates so as to earn the full stipulated return, but the risk of being able to earn it should be left upon the investors. With this risk clearly defined and placed upon investors, the railroad managements would probably select more carefully all additions and improvements, and would regard more critically the costs of operation, than if the return were guaranteed. What would there be unfair or unreasonable in the plan, provided the investors know clearly what risks they are taking when they place their capital at the public service?

The alternative policy, however, of guaranteeing the return, might well be adopted, although it does not necessarily follow the strict limiting of returns. It would have to be considered on its own merits; it has advantages as well as disadvantages. It would reasonably involve much more extensive supervision by the Interstate Commerce Commission of all capital additions and of operation than has been so far attempted. But it would require a lower rate of return on investment. With the guarantee, capital for the future could probably be got at 4 per cent, while with the risk upon investors it would probably average 6 to 8 per cent. The difference in rate is worth considering in deciding which policy to adopt, but the policy should be made definite by legislative enactment so that the investors may know what risks they are taking.

Difficulty in getting capital.—The third objection is that with the restricted return on investment it would be difficult to get the necessary capital for desired additions and improvement. As for the past, the capital is fixed and cannot be removed; we have merely the question of treating it fairly. For the future, the ability to get capital will depend altogether upon the risks of the business and upon the return allowed. One of the chief difficulties in recent years has been the uncertainty; the investors have not known what to expect. But, if we make the risks clear and definitely determine the restrictions, why should we not get all the necessary capital, provided we are willing to pay a high enough return? The rate of return would have to be determined by market conditions. Whenever investments are to be made and securities sold for the purpose, the purchasing price could not be determined by the Interstate Commerce Commission or Congress, but would depend upon the market. The return allowed would be the rate involved in the issue of securities, which would be a definite contractual matter. In case of bonds, the situation would be no

different from what it has been in the past; the bondholders would get the interest definitely stipulated and the rate of return would be that involved in the issue of the bonds. For capital stock, the best plan would be to provide a fixed dividend, and then make the issue above or below par as circumstances demand. The stocks would be similar to present preferred stocks or junior lien bonds. The rate of return would have to be higher than for bonds, and in most cases would have to be 6 or 8 per cent, depending upon the risks involved. The proper question in any case for the Commission to determine would be whether the new expenditures would be worth the costs involved in the issue of securities to provide the funds. If the expenditures seemed justified, the return would then be a contractual matter. The obligation of the public would be fixed and investors would know what to expect. Why would not this plan make available all the capital needed for justifiable railway purposes?

Difficulty in establishing a fair method of valuation.—The fourth objection is that while in general the proposed scheme may be desirable, at the present time a fair valuation policy applicable to past investments could probably not be established; the cost of reproduction method would probably be selected, which would capitalize permanently against the public not only present high prices of materials and labor but more especially the unearned land values amounting to perhaps two billion dollars,—and the method would then be inevitably imposed upon all public utilities. The feeling is that if present methods are permitted to continue for ten or fifteen years longer, prices may return to a much lower level, legislative and judicial opinion will probably shift to a much more favorable public view, and the continued uncertainty will thus be more than compensated by the more reasonable method of valuation that ultimately will be established. This view involves a prophecy of future prices, the interpretation of distant public opinion, and the balancing of the public gains and losses of alternative policies; and, of course, it cannot be conclusively refuted or established. But why may we not expect a reasonably fair method of valuation now, if the matters in question are carefully studied and reported to Congress? If definite legislation is not provided, judicial dependence will continue, and where in recent decisions is there any clear indication that fairer public results may ultimately be expected than through present congressional action? And, finally, can we not afford to be mod-

erately liberal to the railroads for the sake of definite regulation in the future?

Unfairness of a single method of valuation.—The fifth objection is that any single method of valuation universally applied to past investment would be unjust in many individual cases. The view is that, for a fair valuation, the special circumstances of each particular case must be carefully considered. Undoubtedly justice to investors must be one of the chief considerations in determining a method of valuation, but narrow regard for individual justice must not override the requisites of desirable national policy. True, many investors would lose some immediate present value while others would gain, but on the whole substantial justice will be maintained if the methods adopted are reasonable. But, in turn, let me ask, does present rate procedure have due regard for all the circumstances of a case? Is not the chief effort in every case to make a valuation which will be approved by the courts? Are not the latter supposed to have a single fundamental view of value to which all individual cases should conform? Further, is it really feasible to base the valuation upon the special circumstances? To the extent that this may be attempted, do not past decisions indicate that additions will be allowed for unfavorable circumstances but no deductions for favorable conditions? Finally, however, is not a clearly defined future right of more importance to investors than the sacrifice of a possible present undefined right?

Restriction upon efficiency.—The sixth objection is that limiting the return on investment would restrict progressive operating efficiency of the railroads. This deserves very serious consideration, much more than is possible at this time. It is the crucial question in the determination of any regulatory policy or in the adoption of government ownership and operation of railroads. But it probably applies no less to present methods of regulation than to the proposed plan, and the latter at least will achieve the fundamental purpose of regulation—the control of return on investment. To give up regulation is out of the question, and would not definiteness of procedure justify considerable loss of operating efficiency?

But would there be a loss? My feeling is that while there might be losses in some directions, with the greater certainty, with the greater coöperation established between the Commission and the railroads, and with the greater emphasis placed upon the national significance of our railway system, there would be a great gain in

net efficiency. Further, I doubt very much whether, in any great modern business organization, profits are really the prime incentive to progressive efficiency. These are all-important questions of fact which should be thoroughly studied in connection with any comprehensive railway policy that may be determined. But, unfortunately, they are facts especially subject to prejudiced interpretation.

The difficulty of determining the exact returns.—The final objection that can be considered at the present time is the difficulty or impossibility of determining the exact returns realized by a company. Whether particular charges should be made to capital, to operating expenses, or to a special reserve or surplus, must frequently be determined arbitrarily. Expenses may therefore be unduly inflated or understated, so that the net return would be inaccurately reported. This, of course, is true, but it would not destroy the definiteness of the plan outlined. Honest accounting would have to be assumed as in the past, and the Interstate Commerce Commission should have control of the accounting methods so as to prevent unreasonable practices. Proper repairs and depreciation should be included in operating expenses, and the Commission should keep close enough contact with the operation to know whether the charges are reasonable or not.

But suppose that either excessive or deficient charges have been made, what possible gain could a company obtain for the investors? The interest and dividend payments would be fixed, whether the net returns are over or understated, so that there would be no object in deliberate falsification. But if for a time the repairs and depreciation allowance happened to be somewhat excessive, it would not be a serious matter; the public would be building up the property, but the investors would derive no unearned benefit. Likewise if the charges were inadequate for a time, the results would not be grievous, for the investors would get no advantage from the overstated profits. The determination of proper charges would be a matter of reasonable apportionment of costs between present and future operations. If the charges proved inadequate, they could subsequently be increased, or if they appeared excessive, they could be readily diminished. Since there would be no purpose in falsification, there would be no special danger in the inevitable accounting inaccuracies. But the Commission would be free from its present impossible duties and would have more time to keep track of the particular operating and accounting policies and to require changes whenever they seemed desirable.

Advantages.—Finally, let me summarize briefly the advantages of the proposed plan: (1) The confusion that has attended railway investments would be cleared up; investors would know exactly the terms on which their property is used for public purposes, and the obligations of the public would be clearly fixed. (2) If the purpose of regulation is to limit the return on investment, the purpose would be practically achieved, subject to automatic accounting control. (3) The Interstate Commerce Commission would be relieved of the tremendously burdensome task which, in the nature of the railway business, it is not capable of performing, i.e., fixing rates according to cost; and it would be free to devote its energies to matters where it can bring about permanently useful results. (4) While every railroad would have a free opportunity to earn the return that the investors are entitled to receive, the favorably located properties would provide large revenues for public purposes. This would be a form of indirect tax, but one that would place the minimum burdens upon business, would bring large revenue, and would be easily collectible.

But if the proposed plan is not adopted in its essentials, what alternative policy may reasonably be considered? Shall we continue with the present undefined procedures? If so, what use can finally be made of the valuation figures? Will they be worth a cost of \$75,000,000? Has the time not come when we should adopt a railway policy constructed along lines of national requirements? If not the policy here outlined, what practical and reasonable alternative should we accept?